UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
REGION 5
77 WEST JACKSON BOULEVARD
CHICAGO, IL 60604-3590

APR 08 2011

REPLY TO THE ATTENTION OF:
L-8J

Mr. David Lusk
President, Wayne Disposal, Inc.
Corporate Offices
36255 Michigan Avenue
Wayne, Michigan 48184-1652

Re: Extension of TSCA/PCB Approval

Dear Mr. Lusk:

The U.S. Environmental Protection Agency, Region 5, hereby extends the expiration date of the August 21, 2001, Approval for Wayne Disposal, Inc. (WDI), to dispose of Polychlorinated Biphenyls (TSCA/PCB Approval) from the current expiration date of April 15, 2010, to September 30, 2011.

I am extending the expiration date in order for WDI to continue its current operations until a new TSCA/PCB Approval can be issued.

The existing TSCA/PCB Approval was issued in accordance with Section 6 of TSCA, 15 U.S.C. § 2605, and the federal PCB regulations at 40 C.F.R. § 761.75. This extension does not relieve you of the responsibility to comply with TSCA and any and all applicable federal, state and local laws, regulations and requirements. Furthermore, any violation of the terms and conditions of the TSCA/PCB Approval may be subject to enforcement action under Section 15 of TSCA.

If you have any further questions regarding my letter, please feel free to contact James Blough, of my staff, at (312) 886-2967.

Sincerely,

Richard C. Karl
Acting Director
Land and Chemicals Division

UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
REGION 5

IN THE MATTER OF:	)	
	)	
Wayne Disposal Incorporated,	)	**CHEMICAL WASTE LANDFILL**
49350 North I-94 Service Drive,	)	**APPROVAL TO DISPOSE OF**
Belleville, Michigan 48111-1854,	)	**POLYCHLORINATED BIPHENYLS**
	)	**(PCBS) ISSUED PURSUANT TO**
corporate address	)	**40 CFR § 761.75**
	)	
Wayne Disposal Incorporated,	)	
36255 Michigan Avenue,	)	
Wayne, Michigan 48184-1652,	)	
	)	
PERMITTEE.	)	
	)	

AUTHORITY

This chemical waste landfill approval (the Approval) is issued pursuant to Section 6(e)(1) of the Toxic Substances Control Act (TSCA) of 1976, Public Law No. 94-469,15 U.S.C. § 2605(e)(1), and the federal PCB regulations promulgated thereunder, 40 CFR § 761.75. This approval supercedes the April 14, 1997 Approval issued to Wayne Disposal Incorporated (WDI or the Permittee) and the Ford Motor Company, as amended on December 23, 1998 to reflect a transfer of ownership of the property upon which the subject landfill is located.

Any and all information required to be maintained under or submitted pursuant to this Approval is not subject to the requirements of the Paperwork Reduction Act of 1980, 44 U.S.C. Section 3501, et seq., because such information is collected by United States Environmental Protection Agency, Region 5 (USEPA) from the Permittee for the purpose of assuring compliance with this Approval.

EFFECTIVE DATES

This Approval is effective upon the signature of the Director of the Waste, Pesticides and Toxics Division, Region 5, USEPA. On that date, the issuance of this Approval shall be considered a final agency action.

BACKGROUND

Section 6(e)(1)(A) of TSCA requires that USEPA promulgate rules for the disposal of Polychlorinated Biphenyls (PCBS). The rules implementing Section 6(e)(1)(A) were published in the Federal Register on February 17, 1978 (43 FR 7150) and recodified in the Federal Register on May 6, 1982 (47 FR 19527). New rulemaking on PCB disposal published on June 29, 1998 went into effect on August 28, 1998. These rules require, among other things, that various types of PCBS be disposed of in USEPA-approved disposal facilities, 40 CFR § 761.75. The February 17, 1978 Federal Register notice also designated the Regional Administrator as the approval authority for PCB disposal facilities.

On July 10, 1995, WDI, as lessor and operator of a hazardous waste landfill located at 49350 North I-94 Service Drive, Belleville, Michigan (The WDI Landfill), submitted an application to USEPA for approval under 40 C.F.R. § 761.75, to dispose of PCB contaminated waste in Master Cell VI (the Cell) of the WDI Landfill. The WDI Landfill was originally authorized under authority granted by the Resource Conservation and Recovery Act (RCRA), as amended, 42 U.S.C. § 6901 et seq., and is operated pursuant to a RCRA Hazardous Waste Management Permit issued by USEPA and a Hazardous Waste Management Facility Operating License issued by the Michigan Department of Environmental Quality (MDEQ).

On April 14, 1997, USEPA issued a TSCA Approval to WDI to allow the disposal of PCB waste in Master Cell VI of the WDI Landfill. On May 29, 1998, WDI requested a modification to its Approval due to a transfer of the ownership of the property, upon which the WDI Landfill is located, from the Ford Motor Company to WDI. The Approval was modified on December 23, 1998 to reflect this transfer of ownership.

On August 24, 1999, WDI submitted an application to MDEQ requesting a major modification of its April 14, 1997 RCRA hazardous waste management facility operating license for the WDI Landfill. The proposed modification to the WDI Landfill was for a design change to Master Cell VI to expand the capacity of this hazardous waste cell.

On March 23, 2000, WDI submitted to USEPA an application, pursuant to TSCA and 40 C.F.R. § 761.75(c), for an amended approval to modify the design of Master Cell VI to expand the capacity of the cell to allow for the disposal of additional PCBS in the WDI Landfill. The application proposed to expand Master Cell VI by extending the cell both vertically and horizontally over a closed and capped portion of WDI's existing hazardous waste landfill.

On October 27, 2000, USEPA issued a letter to WDI requesting additional information concerning its March 23, 2000 TSCA PCB Approval application. On November 28, 2000, WDI submitted a response to the Agency's October 27, 2000 request for additional information.

On December 21, 2000, USEPA issued a Technical Direction Review Memorandum (TDRM) to TechLaw Incorporated, Chicago, Illinois (TechLaw) (EPA Contract # 68-W-99-017) requesting external peer review of certain issues concerning the stability of the proposed WDI landfill. On December 28, 2000, the Agency issued a TDRM to USEPA's Technology Support Center in Las Vegas, Nevada (LVTSC). Following the procedure used for peer review in the Agency's original WDI TSCA Approval review, LVTSC forwarded USEPA's TDRM to an outside consultant, the Idaho National Engineering and Environmental Laboratory (INEEL) in Idaho Falls, Idaho.

On March 2, 2001, LVTSC/INEEL provided USEPA with a copy of its final technical evaluation of WDI's proposed expansion of its hazardous waste landfill. On March 22, 2001, USEPA amended its Technical Direction memorandum to TechLaw to add an additional task and to request a consolidated report by the peer review panel. On April 23, 2001, TechLaw provided USEPA with a copy of its final technical evaluation of WDI's proposed expansion of its hazardous waste landfill.

WDI's March 23, 2000 Application to USEPA for a modified chemical waste landfill approval for the disposal of PCBS, as amended on January 31, 2000 and March 30, 2001, consists of a number of documents, as listed in an Attachment to this Approval.

On June 5, 2001, USEPA issued a revised delegation in response to a March 9, 2000 revision of USEPA Headquarters Delegation 12-5. USEPA Headquarters Delegation 12-5 was revised to recognize the PCB Disposal Amendments, which were published in the Federal Register on June 29, 1998, and then codified at 40 CFR Parts 750 and 761. The revised USEPA Headquarters delegation also encompasses the authority to approve or deny permit applications to operate PCB storage and disposal facilities, an authority which had been previously contained in Headquarters Delegation 12-21. Accordingly, on June 5, 2001, USEPA delegated, among other things, the authority to approve or deny permit applications to operate PCB storage and disposal facilities from the Regional Administrator to the Director of the Waste, Pesticides and Toxics Division.

DEFINITIONS

The following terms are defined for the purposes of this Approval. Any conflict between the following definitions and those set forth under TSCA or the PCB regulations shall be resolved in favor of TSCA or the PCB regulations.

APPLICATION: All data, documents, licenses, permits and other information submitted to date by the Permittee to USEPA in order for the Agency to properly review the Permittee's request for an amended TSCA Approval.

ANNUAL REPORTING PERIOD: A regulatory interval based on the calendar year. It includes a July 15 due date for the previous year's annual reports required by this Approval.

ARTESIAN CONDITIONS: Those hydraulic conditions where water naturally rises to elevations above the geologic unit in which the water is found.

AQUIFER: A geologic formation or group of formations or part of a formation that is capable of yielding a significant amount of groundwater to a well or springs.

BATCH: A specific volume that is handled as a whole and is sampled in a representative way.

CELL: The specially prepared unit into which PCBS are disposed. It consists of the entirety of Master Cell VI (Subcells A, B, C, D, and E), as expanded, and any related appurtenances thereto.

CLAY PAN: A continuous, laterally extensive, relatively impermeable thick bed of high clay content material.

CLOSURE: The cessation of the use of Master Cell VI for the disposal of PCBS and proper closure of the Cell, including the installation of a cap as approved in writing by USEPA. The Permittee must get written approval from MDEQ and the Director of the Waste, Pesticides and Toxics Division, USEPA prior to closure of Master Cell VI.

CLOSURE AND POST-CLOSURE PLAN: A written plan developed by the Permittee that describes in detail how the Facility will be closed; the care that will be provided after closure; a closure and post-closure cost estimate and a demonstration of financial responsibility to close the facility and provide post-closure care in perpetuity. Whether or not the Permittee has already provided a RCRA Closure and Post-Closure Plan to MDEQ and USEPA, 180 days prior to closure, the Permittee must provide USEPA an updated Closure and Post-Closure Plan. USEPA must approve the updated Closure and Post-Closure Plan in writing prior to closure of Master Cell VI.

DILUTION: The avoidance of TSCA requirements and the conditions of this Approval by combining non-TSCA regulated material, with TSCA regulated material or otherwise numerically averaging sample values from TSCA and non-TSCA cells so that the mixture becomes deregulated.

DRY WEIGHT: Reporting based on a dry weight determination for all solids and semi-solids and fluids with a concentration of more than five tenths (0.5) percent solids content.

ERODIBLE: An area which is subject to soil loss and reduced capacity which requires maintenance activities, especially those identified according to such models as the universal soil loss equation.

EXPIRATION OF APPROVAL: The cessation of the Permittee's authority to dispose of PCBS in Master Cell VI in perpetuity and the removal of all PCBS from Master Cell VI.

EXPIRATION OF DISPOSAL AUTHORITY: The Permittee's authority to continue to place PCBS in Master Cell VI will cease five (5) years after the date the Approval is executed by the Director of the Waste, Pesticides and Toxics Division, Region 5, USEPA. The Director of the Waste, Pesticides and Toxics Division, Region 5, USEPA may extend this date at his or her discretion, however, an extension of this date will require a major modification of the Approval.

FACILITY: Cadastral boundaries of the property in which the TSCA approved disposal Cell is located.

FINANCIAL ASSURANCE DOCUMENT: A document setting forth the mechanism by which the Permittee will assure the performance of or the payment for maintenance, oversight, monitoring and other necessary activities to assure the perpetual effectiveness and integrity of the landfill and all of its containment systems before, during and after the closure of Master Cell VI. The financial assurance mechanism must assure sufficient funds to pay for post-closure care of Master Cell VI in perpetuity.

FLOOD: Internal to the cell: to raise the leachate level to more than one foot above the liner. External to the cell: to exceed the facility's on-site water holding capacity so as to allow unauthorized offsite discharge.

FREE LIQUIDS: Fluid that drains freely from waste material under the Paint Filter Test, USEPA SW-846 Method 9095. Wastes cannot be disposed of containing these fluids. The Liquid Release Test is recommended to estimate leachate production.

DECONTAMINATON WASTE WATER: Runoff from contaminated vehicular traffic areas after spills, but before cleanup, captured wash water from vehicle washing areas, and purge water from contaminated wells.

LATERAL ACCELERATION OF THE CELL: Movement of any stability monitoring station that indicates an increase in the time rate of change of the velocity of tilt, station displacement or any other relevant survey measures.

LEACHATE: Water that filters through the waste and collects in the cell, also rainwater that floods into the cell through manways is leachate if it mixes with leachate.

LEACHATE ESCAPE: Anything flowing out of the clean-out risers for the cell, rainwater in contact with waste or mixed with leachate that leaves the containment cell and overcomes Master Cell VI's on-site control structures whether or not it leaves the land owned by the Permittee.

LEAK DETECTION, COLLECTION AND REMOVAL SYSTEM: The network of drains and sumps between the inner synthetic geomembrane and the outer synthetic geomembrane to detect leaks.

MAJOR MODIFICATION: A material change in the design or operation of the WDI Landfill. Such changes include, but are not necessarily limited to: any change in ownership; an increase in the disposal capacity of the landfill; any change in the manner of waste placement; any significant change to the financial assurance estimate or commitment; any change to the closure/post-closure plan, cap repairs, abandonment and any change to the settlement monitoring plan. A major modification requires the approval of the Director of the Waste, Pesticides and Toxics Division, Region 5, USEPA. Any oral or written modification other than that made by the Director shall be null and void.

MINOR MODIFICATION: A minor change in the design or construction of the WDI landfill or in day-to-day operation of the Landfill or any change in operations that is not a major modification. Such changes in operations include but are not limited to, for example, changing the groundwater, leachate or air monitoring sites or the analytical methodology, any change to any portion of the leachate collection, detection, and removal system, not including repairs; changes in waste acceptance procedures, changes in the closure post-closure plan that are not major, and minor inflationary adjustments to Permittee's annual cost estimate. A minor modification requires the approval of the Chief of the Pesticides and Toxic Substances Branch (PTSB), Region 5, USEPA. Any oral or written modification other than that made by the Chief of PTSB shall be null and void.

MODIFICATION: A material change to the design or operation of the WDI landfill that requires notification and approval of the USEPA. Any decision to approve a modification is at the sole discretion of the USEPA.

OPERATOR: Wayne Disposal Incorporated, 49350 North I-94 Service Drive, Belleville, Michigan 48111-1854. Wayne Disposal Incorporated operates Master Cell VI and is responsible for the day-to-day operations of the WDI Landfill.

OWNER: Wayne Disposal Incorporated, 36255 Michigan Avenue, Wayne, Michigan 48184-1652. Wayne Disposal Incorporated is the owner of the property upon which the WDI Landfill, including Master Cell VI, is located and is the insured party for liability and performance.

PCB(s): Polychlorinated Biphenyl(s)

PCB CONTACT WATER: All untested fluids produced from within the Cell or fluid known to have contacted PCBS.

PERMITTEE: Wayne Disposal Incorporated, located at 49350 North I-94 Service Drive, Belleville, Michigan, 48111-1854.

PERPETUAL CARE: maintenance, oversight, monitoring, inspections and any other care of the landfill which will last in perpetuity or until all PCBS are removed from the landfill.

PERPETUITY: An infinite amount of time unless otherwise determined by USEPA.

POST-CLOSURE CARE: After closure of the Facility, the Permittee shall care for Master Cell VI in perpetuity. Such care shall include the continuation of all maintenance, monitoring and reporting requirements set forth in the Approval. It also shall include a requirement to take immediate corrective action should it be determined by USEPA that the chemical waste landfill provides an unreasonable risk to injury to health or the environment from PCBS. Such corrective action could require removal of some or all PCBS from Master Cell VI. Post-closure use of the Facility shall not disturb the integrity of any portion of Master Cell VI, unless USEPA determines that such disturbance is necessary to protect human health or the environment.

POST-CLOSURE PERIOD: The period of time after operations at the landfill have ceased and the final cap has been installed on the landfill, i.e., after the landfill has been closed. This period shall last in perpetuity unless all PCBS are removed from the landfill.

PLACEMENT OF PCBS: The use of equipment to bring PCB waste to the Cell, off-load it in the Cell, compact it in the Cell to proper density and cover it.

PPM: A unit of measure, parts per million, used to establish regulatory thresholds for material under TSCA based on use of an appropriate gravimetric reporting methodology such as wet weight or dry weight.

PRIMARY LEACHATE COLLECTION SYSTEM: The network of drains and sumps resting above the inner synthetic geomembrane that collects leachate that drains from the waste.

QUARTERLY REPORTING PERIOD: A chronological system denoted by the beginning of the first, fourth, seventh and tenth calendar months of the year.

SIGNIFICANT RAINFALL: One half inch or more of rainfall in twenty-four hours.

SITE: The vertical and horizontal dimensions of Master Cell VI as expanded and defined by the architectural and engineering design documents submitted to USEPA by the Permittee as part of its TSCA Approval application. The terms and conditions of this Approval apply to the operation of the WDI Landfill and are not limited in their applicability to only the Site.

STABILIZATION: The use of an additive material that permanently changes the waste to prevent the release of water or chemicals under the expected physical effects of the landfill process such as compression and leaching.

STATISTICALLY SIGNIFICANT INCREASE: A determination using statistical procedures appropriate to the respective sampling plan in the TSCA application as modified.

SUSPENSION OF DISPOSAL AUTHORITY: Temporary removal of the Permittee's authority to continue to place PCBS in Master Cell VI. Such authority may be reinstated at USEPA's discretion.

TERMINATION OF DISPOSAL AUTHORITY: Permanent removal of the Permittee's authority to continue to place PCBS in Master Cell VI. Such termination will not necessarily result in expiration of the Approval, as USEPA may allow Master Cell VI to be closed and maintained, per the terms and conditions of this Approval, in perpetuity.

TSCA DISPOSAL: The placement of PCB waste in Master Cell VI of the WDI Landfill and the operation and maintenance of Master Cell VI in accordance with this Approval.

TREATMENT: Changing the disposal status of a regulated waste by removing or destroying PCBS.

WET WEIGHT: Reporting based on a wet weight measurement for fluids with solids content less than five tenths (0.5) percent.

FINDINGS

1. The Permittee currently operates an approved TSCA chemical waste landfill: Master Cell VI located at the WDI Landfill in Belleville, Michigan. The Cell and the WDI Landfill are also regulated by the State of Michigan under RCRA. The WDI Landfill is a facility:

   a. whose SE corner is located at 42 Degrees, 13 Minutes 19 Seconds north latitude, 83 Degrees, 31 Minutes 5.1 Seconds west longitude,

   b. whose NE corner is at 42 degrees 13 minutes 41 seconds north latitude, 83 degrees 31 minutes 5.7 seconds west longitude,

   c. whose NW corner is located at 42 degrees 13 minutes 41 seconds north latitude 83 degrees 31 minutes 22 seconds west longitude, and

   d. whose SW corner is at 42 degrees 13 minutes 19.3 seconds north latitude, 83 degrees 31 minutes 21.7 seconds west longitude, Van Buren Township, Michigan.

2. The Permittee's mailing address and physical address is: 49350 North I-94 Service Drive, Belleville, MI 48111-1854.

3. The WDI Landfill is bounded on the north and west by the Willow Run Airport; to the south by the I-94 North Service Drive; and to the east by Beck Road.

4. Master Cell VI (Subcells A, B, C, and D) and its expansion, Subcell E, is in a thick, relatively impermeable large-area clay pan.

5. The Cell is not located in the 100-year flood plain.

6. The hydrogeological characteristics at the landfill site provide a significant level of hydrologic protection over and beyond requirements stated for engineered structures under TSCA for waste confinement including but not limited, to the following reasons:

   a. USEPA's review indicated that the clay pan covers a large area (at least 480 acres), and is effectively continuous and relatively impermeable. Testing has demonstrated no downward natural seepage of water at least since 1953 even though there is approximately five feet of groundwater standing directly upon the clay pan. Breakthrough times for the clay pan are very long, and piezometers installed in the clay indicate that the water flux across the clay is very low. There is no hydraulic connection between the base of Master Cell VI's (Subcells A, B, C, and D) lowermost geomembrane and standing or flowing surface water. The clay serves as an aquiclude and naturally protects the "Upper Aquifer" below it. The unprotected, thin Upper Sand Unit resting upon the clay pan was excavated so the new liner for Master Cell - Subcell E rests either on a clay cap or on the clay pan.

b. The Permittee certified that the bottom of the Cell liner system for Cell VI (Subcells A, B, C, and D) is underlain by at least ten (10) feet of clay with a permeability less than 1×10^{-7} cm/sec. The bottom of the Cell liner system for Master Cell VI (Subcell E) is underlain by at least ten (10) feet of clay with a permeability less than 1×10^{-7} cm/sec and Master Cell V.

c. Master Cell VI (Subcell E) will be underlain by a clay pad that meets TSCA requirements and is now underlain about 50 feet of waste and a TSCA clay pan.

d. The cap of Master Cell V will be redesigned to meet TSCA requirements for the base of Master Cell VI (Subcell E).

e. The naturally protected Upper Aquifer below the clay pan along with the relatively low permeability of the clay pan help maintain the potentiometric or artesian forces that result in the local no flow zone in the clay pan below the Cell.

f. The Upper Aquifer is partially confined and is defined in the immediate vicinity of the Cell by many stratigraphic test bores and screened wells.

g. Municipal water supplies are no longer drawn from the Upper Aquifer. The nine (9) wells of the Bridge Road-Rawsonville Road array were shut down in 1994 and the seven (7) well array in the City of Ypsilanti and the well along Superior Road bridge were shut down in 1996. They are all upstream of the facility. Some of these wells may be used in the future.

h. There is an aquitard located immediately below most of the clay pan.

i. There is no tritium in the groundwater from the lower sand aquifer. Therefore, the clay pan has isolated the aquifer from rain for the last 50 years.

j. The existing Master Cell V underlying the proposed extension cell serves as a backup leachate collection system for any fluids that might escape the extension.

7. The local soil profile is made up of five units:

a. The Upper Sand Unit is an unprotected, highly permeable, water-bearing, gravelly sand classified as unusable by Michigan Department of Public Health. The ground water in the Upper Sand around Master Cell VI (Subcells A, B, C, D and E) is too shallow for use and did not meet the Michigan Department of Public Health's criteria of being a minimum of twenty-five (25) feet below the ground surface. During construction, the whole sand unit was removed from around the Cell and replaced with a ten-foot thick compacted clay isolation barrier. Most of subcell VI-E is built on top of Master Cell V or overlies a narrow earthen berm of undisturbed clay pan between Master Cell V and Master Cell VI. The new subcell is isolated from everything below it by approximately 11 feet of new geo-composite liner/pad.

b. The Clay Pan is a laterally extensive glacially derived silty clay layer. It is a regional barrier to water flow and, where Master Cell VI and Master Cell V are seated, it maintains a minimum of ten (10) feet of relatively impermeable material below the cell. The permeability under Master Cell VI is certified to be less than 1×10^{-7} cm/sec. The permeability of native clay samples from under Master Cell V is similar to that under Cell VI. Permeabilities are 1×10^{-7} cm/sec or less. Such results together with consistent elevations of clay in drill hole measurements indicate that the clay under the two cells is geologically identical and is part of a larger clay pan. The permeability below Cell VI and Cell V is very low and satisfies the TSCA siting criterion for a "relatively impermeable formation" that meets TSCA siting requirements for an unlined landfill.

c. Cell V and Cell VI (Subcells A, B, C, and D) is underlain by at least ten (10) feet of clay with a permeability less than 1×10^{-7} cm/sec.

d. The Transition Silt Unit is a partly water-bearing fine grained sand silt aquitard unit with as much as 16-35% clay in it, directly underlying most of the clay pan but overlying the Upper Aquifer. Permeability tests on the unit yield laboratory values of 1.3×10^{-8} to 6.9×10^{-6} cm/sec.

e. The Lower Sand "Drift Aquifer" or "Buried Valley Aquifer" is a partly confined, protected, highly permeable and useable sandy aquifer located on fractured limestone and shale whose pressure head varies from ten (10) feet below the secondary liner to just at the base of the primary liner of the Cell. It is defined as the "upper aquifer" for regulatory purposes despite being below the clay pan. The thin sand unit resting on top of the clay and surrounding the cell is not considered an aquifer. Local groundwater resources are generally unused. The Lower Sand unit has generally been abandoned in favor of Detroit municipal water sources but the aquifer may be used in the future so it is being monitored.

f. The bedrock units;

   i. the non-water bearing Paleozoic Antrim Shale

   ii. the Traverse Group limestones containing useable but generally undesired water

8. Quirk Drain is designated as a surface water course to be monitored under the State of Michigan's Clean Water Act, National Pollution Discharge Elimination Program by means of a general Certificate of Coverage dated June 2000 that covers PCBS.

9. PCB placement at the Cell involves the following:

   a. inspection of waste material for conformance with the waste analysis plan including but not limited to the ban on TSCA liquids in landfills;

   b. placement of PCB wastes;

   c. use of a coordinate system to record the location of PCB waste;

   d. inspection of the Cell's integrity, groundwater monitoring in the vicinity of the Cell, analysis of water extracted from the Leachate Collection System and the Leak Detection Collection and Removal System (LDCRS);

   e. maintenance of manifest records in accordance with the PCB regulations and the State of Michigan rules;

10. The Cell and its extension are designed with safety features, in addition to the clay pan, such as:

   a. an eighty (80) mil thick density polyethylene synthetic membrane primary liner and a sixty (60) or eighty (80) mil thick density polyethylene synthetic membrane secondary liner each of which is more than double the minimum membrane thickness specified for a TSCA commercial landfill that is not located on a clay pan or a clay pad under 40 CFR § 761.75;

   b. synthetic membranes separated by sixty (60) inches of re-compacted clay, two feet more than the TSCA commercial landfill minimum in 40 CFR § 761.75;

   c. a compound leachate collection system that consists of a primary and a secondary leachate collection system, the Leak Detection Collection and Removal System (LDCRS), which is more than that specified for TSCA commercial landfills seated in clay pans under 40 CFR § 761.75;

   d. a relatively impermeable clay dike surrounding Master Cell VI; and

   e. a biaxial polymeric geo-grid to strengthen the base of Master Cell VI (Subcell E).

11. The Cell will be operated with safety features which act to prevent releases, or spills to water, soils, or other cells as specified in the Conditions of Approval.

12. The Permittee has provided the Agency with a description of its worker training program. This program is designed to ensure compliance with applicable safety and health requirements and regulations. The training program, as described, encompasses:

    a. safety, record keeping, sampling and analysis;

    b. operational procedures for using, inspecting, repairing, decontaminating and replacing equipment used to identify, monitor, track, transport, dispose, and confine PCBS; and

    c. spill prevention, cleanup and emergency response procedures.

13. Master Cell VI is not located in an area that has rare, threatened or endangered species.

14. The Permittee has filed the document, "Notification of PCB Waste Activity," Form 7710-53 (12-89), and received the unique USEPA waste identification number MID 048 090 633.

15. The Permittee has the following current permits:

    a. Class D Wastewater Discharge Permit (permit number D:11201) from Wayne County. This permit was originally issued on December 1, 1997, reissued by the South Huron Valley Utility Authority on July 27, 2000, modified on January 4, 2001 and expires on November 30, 2001.

    b. Michigan Department of Environmental Quality (formerly Michigan Department of Natural Resources) Part 111 (formerly Act 64) Hazardous Waste Management Facility Operating License for MID 048 090 633.

16. The Permittee submitted a copy of the closure cost estimate/performance bond, with an effective date of August 1, 2000, of $2,620,426 for 2001 and a 30-year post-closure care estimate/performance bond of $4,200,670 to USEPA. Bond number is ESD7310787 with National Union Fire Insurance Co. of Pittsburgh, PA and American Home Assurance Co, of New York.

17. The Permittee has submitted an updated proof of financial assurance funding for closure and post-closure care to the Michigan Department of Environmental Quality.

18. All surface water sample sites were sampled to establish background before PCB waste disposal commenced. Leachate from Cell V must be tested to establish background levels there before PCBS are disposed of in Cell VI, Subcell E.

CONDITIONS OF APPROVAL

SITE LOCATION

19. PCB disposal must be carried out entirely within the Cell, as described in the Application.

SCOPE OF WORK

20. The Permittee is permitted to dispose of the remaining part of its previously approved one million four hundred and thirty five thousand (1.435 million) cubic yards of wastes and may dispose of up to another two million eight hundred ninety thousand (2.89 million) cubic yards of wastes in the Cell, subject to any volume limits imposed by the State of Michigan and subject to an ongoing demonstration that the actual settlement at Master Cell VI-E during construction and filling operations does not damage Master Cell V, the WDI Landfill or threaten to damage it or any portion thereof. Any failure to demonstrate such, will limit the amount of PCB wastes USEPA will allow to be disposed of in Master Cell VI and may result in the termination of such authority.

21. The Permittee must remove all PVC liner material in the cap of master Cell V from below each part of the Master Cell VI, Subcell E before Master Cell VI liner construction begins.

22. Prior to liner construction for the Cell, the Permittee must install a biaxial polymeric geogrid and granular layer designed to prevent subsidence by improving arching in the structural fill beneath Master Cell VI-E. The Permittee must provide USEPA in writing the design details and factor of safety calculations of the geogrid for USEPA written approval prior to construction.

23. Any TSCA waste that fails the RCRA paint filter test (SW-846 Method BL), for reasons other than incidental liquids, must be rejected. Incidental water produced during transport may be handled according to the TSCA regulations.

WASTE PLACEMENT AND LEACHATE MANAGEMENT

24. Waste must be capable of attaining sufficient strength to prevent subsidence, ponding on the waste or on the cap, and slope movement, i.e., creep.

25. Indications of slope failure or leachate escape from Master Cell VI and all its subcells shall trigger all emergency notification processes and shall subject the Permittee to immediate corrective action including possible work stoppage, drainage control, emergency berms, soil reinforcement and possible closure.

26. Each load of regulated PCB waste must be inspected, compared and reconciled with the manifest and the Waste Analysis Plan.

27. PCB Waste must be logged into the Cell's waste placement coordinate system.

28. Vehicles that enter the active portion of the landfill must be washed clean of soil before leaving the cell. Vehicles delivering waste to, but not entering the active portion of the landfill, must be washed at the wheel wash house or equivalent wash before entering the public road.

29. All waste transport vehicles must be inspected according to the existing Michigan Hazardous Waste Operating License, those that leak PCB wastes must be contained immediately and not leave the site until the leak is stopped.

30. PCB waste may not be placed anywhere in the Cell if it is incompatible with the geomembrane. PCB wastes may not be placed on top of wastes that carry residual heat, such as warm stabilized hazardous waste.

31. The Permittee must reduce the depth of leachate in each subcell to less than one (1) foot over the primary liner within seventy-two (72) hours of its exceeding that depth. The Permittee may return leachate to the WDI Landfill to reduce the leachate depth in the Cell.

32. Placement of PCB waste in Master Cell VI-E is contingent upon a quarterly written demonstration to USEPA, (i.e., the quarterly settlement profile monitoring report required by the Settlement Monitoring Work Plan as described below) that the settlement of Master Cell VI -E is within predetermined settlement indicators identified in the USEPA approved Settlement Monitoring Work Plan.

SETTLEMENT MONITORING

33. Within sixty (60) days of the effective date of this approval, The Permittee must submit to USEPA a Settlement Monitoring Work Plan (SMWP) for monitoring settlement during construction and filling operations for the liner system for Master Cell VI - Subcell E. The SMWP must describe in detail the equipment to be used for the monitoring, the frequency and type of data collection, and the representation of the data in quarterly reports. USEPA must approve the SMWP in writing prior to the final construction of Master Cell VI - Subcell E. No more than a total of one million four hundred and thirty-five thousand (1.435 million) cubic yards of wastes may have been placed in Master Cell VI prior to USEPA approval of the SMWP.

34. If the settlement monitoring required by the USEPA-approved SMWP demonstrates that the settlement indicators at Master Cell VI-Subcell E measured during construction and filling operations exceeds those identified in the SMWP, the Director of the Waste Pesticides and Toxics Division, Region 5, USEPA shall be notified within 72 hours and all

construction and filling operations (PCB and non-PCB waste) shall immediately cease pending USEPA review and shall not continue until such adverse settlement has been cured or will be cured to the satisfaction of USEPA. Failure to abide by this condition could result in the immediate termination of the Permittee's authority to dispose of PCB waste in Master Cell VI. Complete failure to ameliorate the resulting settlement will result in closure of Master Cell VI in its entirety.

LEACHATE/WATER COLLECTION MONITORING AND DISPOSAL

35. Dilution to avoid the TSCA PCB regulations is prohibited.

36. All leachate and leak detector water if any from Master Cell-VI must be sampled prior to mixing with leachate/water from other sources. Samples with a PCB concentration less than fifty (50) ppm generated from the Cell must be treated at the Permittee's wastewater treatment plant in accordance with the Class D Waste Water Discharge Permit issued by the South Huron Wastewater Treatment Plant or shipped off-site to a facility permitted to treat or dispose of PCB contaminated leachate.

37. All leachate/water with a PCB concentration of fifty (50) ppm or greater must be stored in accordance with 40 CFR § 761, Subpart D storage requirements pursuant to a Spill Prevention Control and Countermeasures (SPCC) plan until disposed of at an approved TSCA disposal facility.

38. Leachate production volume from the primary leachate collection system in Cell VI and Cell V must be determined monthly.

39. The Permittee must test leachate monthly by collecting a composite sample from the Primary Leachate Collection System of Master Cell VI from the forcemain pipe leading into the water treatment plant and a representative sample from Master Cell V and analyzing the sample for:

    a. PCB
    b. pH
    c. Specific Conductance
    d. chlorinated organics
    e. physiochemical characteristics necessary to characterize the leachate for treatment and disposal
    f. the depth of the leachate over the primary synthetic membrane liner.

40. The Permittee must collect a semiannual leachate sample from the Primary Leachate Collection System of each subcell of Master Cell VI and analyze the samples for:

    a. PCB
    b. pH
    c. Specific Conductance

d. chlorinated organics
e. physiochemical characteristics necessary to characterize the leachate for treatment and disposal
f. the depth of the leachate over the primary synthetic membrane liner.

41. The Leachate sampling program must include samples from any subcell that contains regulated PCBS, and Master Cell V including:

a. Master Cell VI Subcell A North Primary
b. Master Cell VI Subcell A South Primary
c. Master Cell VI Subcell B Primary
d. Master Cell VI Subcell C Primary
e. Master Cell VI Subcell D Primary
f. Master Cell VI Subcell E NE Primary
g. Master Cell VI Subcell E NW Primary
h. Master Cell VI Subcell E SE Primary
i. Master Cell VI Subcell E SW Primary
j. Master Cell V primary A-B-C-E composite after background is established as listed in Cell VI "As-Built" drawings for jobs 88237 and 82018 by Midwestern Consulting of Ann Arbor, Michigan, numbered VI-A-2, VI-B 101, VI-C2 A, VI-D 3A updated January 26, 1996, and in the Design Modifications, August 1999 NTH job 13-8339 in the Design Modification Plan Fourth Revision April 2001 for Wayne Disposal Inc.

42. The Permittee must sample the leachate from Master Cell V prior to placement of PCB waste in Master Cell VI-Subcell E to establish background levels. The sampling must take place at the following locations:

a. Master Cell V primary A-D
b. Master Cell V primary B
c. Master Cell V primary C
d. Master Cell V primary E

Each sample must be analyzed for:

a. PCB
b. pH
c. Specific Conductance
d. chlorinated organics
e. physiochemical characteristics necessary to characterize the leachate for treatment and disposal

43. The Leak Detection Collection and Removal System (LDCRS) for each Subcell used for PCB disposal must be monitored quarterly for:

    a. quantity of water
    b. PCB
    c. sufficient physiochemical characteristics of the water produced in order to determine whether a leak of the membrane has occurred and to characterize the water for treatment and disposal.

44. The LDCRS Subcell sampling program must include quarterly samples from any subcell that contains PCB including:

    a. Master Cell VI Subcell A North Secondary
    b. Master Cell VI Subcell A South Secondary
    c. Master Cell VI Subcell B Secondary
    d. Master Cell VI Subcell C Secondary
    e. Master Cell VI Subcell D Secondary
    f. Master Cell VI Subcell E-NE Secondary
    g. Master Cell VI Subcell E-NW Secondary
    h. Master Cell VI Subcell E-SE Secondary
    i. Master Cell VI Subcell E-SW Secondary

    as listed in Cell "As-Built" drawings for jobs 88237 and 82018 by Midwestern Consulting of Ann Arbor, Michigan, numbered VI-A-2, VI-B 101, VI-C2 A, VI-D 3A updated January 26, 1996 and in the Design Modification Plans, Aug. 1999 NTH job 13-8339 as updated April 2001, Wayne Disposal Company Inc.

SURFACE WATER MONITORING

45. After commencement of PCB disposal activities, surface water from Site #1 and Site #2, SS1 and SS2 respectively, must be sampled every quarter following the first significant rainfall.

46. All surface water samples must be analyzed for:

    a. PCB;
    b. pH;
    c. Specific Conductance; and
    d. chlorinated organics.

47. The following watercourse monitoring site identified in Plate 2, dated June 2, 1987 (as updated March 6, 1989) by Neyer, Tiseo & Hindo, Ltd., Attachment 14, Appendix F of Volume 6 of the Supplemental Information Report to the Initial Report, undated, by RMT Inc. and part of the RCRA Surface Water Sampling and Analysis Plan, attachment 13 revision 3.4–March 2001 and the state certified surface water protection program under the Clean Water Act is approved:

    a. SS #1
    b. SS #2
    c. SS #3 (outlet from sediment basin to Quirk Drain)
    d. SS #4
    e. SS #5
    f. SS #6

48. After the commencement of PCB disposal, surface water from Site #3 must be sampled once a month when water is being discharged from the surface water management system.

GROUNDWATER MONITORING

49. The Permittee must monitor the groundwater each quarter for chemistry and hydrology. A map of those monitoring sites must be submitted along with the groundwater tables and chemical sample data. Results must be reported in accordance with Condition 79.

50. The following groundwater wells are approved to monitor the Upper Aquifer around the Cell for PCB:

    a. OB-20
    b. OB-21
    c. OB-23
    d. OB-24
    e. OB-25
    f. OB-26A
    g. OB-34R
    h. OB-40R

51. Groundwater must be monitored for:

    a. PCB
    b. pH
    c. Specific Conductance
    d. Chlorinated Organics

52. Wells used to measure water level elevations at the Cell must not be purged or otherwise disturbed prior to measuring the static water level.

SURFACE AND SOIL MONITORING AND SPILL CLEANUP

53. Spills must be cleaned up following the USEPA Spill Cleanup Policy at 40 CFR Part 761, Subpart G.

54. The current and applicable RCRA Contingency Plan and Emergency Procedures must be followed.

55. A composite of six sediment grab samples from the Sediment Basin near the outlet to Quirk Drain must be taken annually and analyzed for PCB.

56. A composite of six sediment grab samples from the "Lined Pond" must be taken annually and analyzed for PCB.

AMBIENT AIR MONITORING

57. Ambient air monitoring for PCB must be conducted. The Permittee must follow the sampling frequency and location specified in the most recent and approved revision of the Ambient Air Monitoring Program. Sampling and analytical methodology must use USEPA Method TO-4. The analytical method must achieve a minimum method detection limit of two hundredths micrograms per cubic meter (0.02 $\mu g/m^3$).

58. Twenty-four hour time weighted average perimeter monitoring using a notification level of three tenth micrograms per cubic meter (0.3 $\mu g/m^3$) is acceptable.

59. Sample points around the perimeter of WDI Site #2 Landfill must be sampled for PCBs every sixth day for a twenty-four (24) hour period. The sample sites are referenced in Figure 7 of the RCRA Ambient Air Monitoring Sampling and Analysis, Revision #4.1, February 8, 2001 and consist of:

    a. Site 5 (82975)
    b. Site 6 (82981)
    c. Site 7 (82977)
    d. Site 8 (82982)
    e. Site 9 (82983)
    f. Site 10 (82984)

FLOOD PROTECTION

60. If the WDI Landfill is ever determined to be in the one hundred (100) year flood plain, the waste in the WDI Landfill must be removed or protected by a flood control structure whose minimum elevation is at least two (2) feet above the respective one hundred (100) year flood plain elevation. Rainwater falling on the cell itself must not be allowed to accumulate to a level that would allow its entry to the leachate collection system or the LDCRS through the manhole risers or clean outs or the LDCRS risers.

SAMPLING

61. Sampling for all TSCA water monitoring purposes, must follow the latest USEPA approved PCB monitoring procedures. Any proposed changes to such procedures must be submitted to USEPA for approval

ANALYSIS

62. The PCB levels for any soil or solid sample must be determined by using:

    a. Appropriate procedures identified by SW-846 Method 3500B (or future USEPA updates) for organic extraction and sample preparation.
    b. Procedures identified by SW-846 Method 3600C (or future USEPA updates) for sample extract cleanup, when necessary/appropriate.

    c. SW-846 Methods 8082 (as updated by USEPA) for analytical measurement. The results must be reported as total PCB, on a dry weight basis (103-105°C), calculated by comparison to Aroclor standards identified by SW-846 Methods 8082 when Aroclors are present. Identified Aroclors used for calculation of total PCB also are to be reported.

63. The PCB levels for any water or leachate must be determined by using:

    a. Appropriate procedures identified by SW-846 Method 3500 (or future USEPA updates) for organic extraction and sample preparation.

    b. Procedures identified by SW-846 Method 3600C (or future USEPA updates) for sample extract cleanup, when necessary/appropriate.

    c. SW-846 Methods 8082 (as updated by USEPA) for analytical measurement.

64. The results must be reported as total PCB calculated by comparison to Aroclor standards identified by SW-846 Methods 8082. Identified Aroclors used for calculation of total PCB are also to be reported.

65. The PCB levels for an air sample must be determined by using Method TO-4.

66. Chlorinated organics in surface water are listed/identified in Table 1 - "Organic Surface Water Monitoring Parameters," as revised. See Attachment 13, *Surface Water Monitoring Sampling and Analysis Plan,* of the Permittee's TSCA Approval application. Chlorinated organics to be monitored are the chlorine containing compounds in Table 1.

67. The chlorinated organics in surface water are to be analyzed by SW-846 Method 8260B (or future USEPA updates), with the provision that any reported 1,2 dichloroethene will include the sum of both isomers (cis and trans).

68. Chlorinated organics in the primary leachate are identified/listed at Figure 6 of Attachment 10, as revised, of the Permittee's RCRA permit, *Leachate Monitoring Sampling and Analysis Plan* enclosed in the Permittees' TSCA Approval application. Chlorinated organics to be monitored are the chlorine containing compounds of the "Volatile Organic Parameters (8260)" and "Semi-Volatile Organic Parameters (8270)" lists in Figure 6 of Attachment 10.

69. The chlorinated organics in primary leachate are to be analyzed by SW-846 Method 8260B (or future USEPA updates) for the volatiles list and by SW-846 Method 8270C (or future USEPA updates) for the semi-volatiles list. It is recognized that in many cases the detection limits shown in the above Figure 6 will not be attained for leachate due to sample dilutions or matrix effects.

70. Chlorinated organics in the groundwater are listed/identified at Table 3, Attachment H and Attachment I, Attachment 9, *Ground water Monitoring Program Sampling and Analysis Plan*, as revised, enclosed with the Permittee's TSCA Approval application. Chlorinated organics to be monitored are the chlorine containing compounds in an unnumbered table entitled, "Method Detection Limits-Organic Analysis" leading with 1,1 Dichloroethane and ending with PCB-1260, Table 3 and in Attachment I, Attachment 9, as revised.

71. The Chlorinated organics in groundwater are to be analyzed by SW-846 Method 8260A (or future USEPA updates).

72. Analysis for PCB, pH, specific conductance and chlorinated organics must be performed in accordance with the Quality Assurance Manual included in the Application.

73. USEPA must approve of the removal of statistically significant increases from monitoring data.

74. Upon demand, the Permittee must give USEPA sample material. USEPA will spike this material and the Permittee must arrange for their laboratory to analyze the spiked samples. The laboratory the Permittee uses must be the one that the Permittee utilizes to analyze samples of the same matrix. The lab must submit the sample results to USEPA and to the Permittee at the same time.

RECORDKEEPING

75. The Permittee must complete and maintain the following annual records for each year by July 1 of the following year including, but not limited to:

    a. uniquely signed and numbered manifests accompanying each PCB waste shipment; and

    b. any Certificates of Disposal generated or received.

76. The Permittee must complete and maintain a written annual document log to include, but not be limited to, the following:

a. name, address, phone number, USEPA identification number of the holder of the TSCA approval and the calendar year;

b. the unique manifest number of every manifest received during the calendar year and from each manifest the following information:

i. The generator's name for each shipment of PCB waste;

ii. the quantity of PCB waste disposed of expressed in cubic yards of waste and kilograms of PCB waste;

iii. the serial number (if available) or other means of identifying each PCB Article (e.g., properly drained transformer) and the weight of the PCB article in kilograms;

iv. a unique number identifying each PCB Container, a description of the contents of each PCB Container;

v. a unique number identifying each PCB Article Container, a description of the contents of each PCB Article Container, such as pipes, electric motors, pumps, etc.;

vi. the first date the PCBS, PCB Articles and PCB Items were removed from service for disposal;

vii. the date the PCB waste was placed in the Cell;

c. the quantity and PCB concentration of leachate with a PCB concentration of one (1) ppm or greater produced from the Cell, and

d. the disposal destination of all leachate with a PCB concentration at or greater than one ppm.

77. All required documents must be collected and maintained for at least twenty (20) years after the disposal Cell is no longer used for the disposal of PCB waste. The required documents must be kept at one central location, and must be made available for inspection by authorized representatives of USEPA.

a. quarterly reporting of all monitoring data and annual reporting of TSCA disposal activity;

b. providing for closure/post-closure care of the Cell and its support facilities including access routes and PCB decontamination areas; and

c. providing closure/post-closure financial assurance.

REPORTING

78. Quarterly reports must be submitted to USEPA within sixty (60) days following the end of the calendar quarter. The reports must include the following data collected during the quarter:

    a. all water elevation data, water table maps for the monitored aquifer and a north-south cross section showing the landfill, the aquifer and water elevations;

    b. leachate/water volume and analytical results from the primary and the secondary leachate collection systems, LDCRS;

    c. A tabular summary of all analytical results of groundwater sampling;

    d. all PCB air monitoring results;

    e. all landfill settlement data and a technical summary of that data;

    f. a graphical plot and summary of the data taken to determine whether any differential settlement is occurring over Master Cell VI and whether such settlement is posing an unreasonable risk to the integrity of the landfill liner;

    g. a summary of the number of cubic yards and kilograms of PCB waste placed in Master Cell VI for the quarter, in addition to the requirements listed in 761.180(b)(3).

79. An annual report must be submitted to USEPA by July 15 of each year for the previous calendar year and must include data for the previous calendar year. For each respective year, the annual report must contain a summary of the written annual disposal log records and annual records and the following information:

    a. sample site locations for leachate/water, groundwater, air, surface water, storm water and sediment samples must be posted/plotted on maps and cross sections;

    b. a graphical time plot of all analytical data from groundwater quality sampling;

    c. piezometric surface elevation contour maps and cross sections for each quarter, showing the Cell, flow paths and flow rates;

    d. graphical time plot of all leachate/water analytical data produced from the primary leachate collection system and the LDCRS;

    e. summary of final PCB concentration of each batch of leachate/water treated on-site;

    f. a graphical comparison between leachate quantity pumped/generated during the reported year and the leachate quantities pumped/generated from previous years together with the concentration, treatment method, and fate of leachate with greater than or equal to one ppm PCB as pumped from the cell;

g. summary of the number of cubic yards and kilograms of PCB waste disposed of that year, in addition to the requirements listed in 761.180(b)(3);

h. graphical time plot of analysis of all TSCA surface water, sediment and air monitoring results;

i. closure and post-closure financial assurance estimates adjusted annually for the forthcoming thirty (30) years; andany additional information as may be required by the Director of the Waste, Pesticides and Toxics Division, Region 5, USEPA.

80. The Permittee must supply to USEPA every PCB report sent to MDEQ, the results of local air monitoring work around the Cell working faces, including any temporary air monitoring site locations, interim cleanup action results and any state cleanup approvals.

NOTICE

81. Within one working day, the Permittee must notify USEPA by telephone of any incident, anomaly or accident that may affect the disposal conditions of this approval or that has or may result in the release of PCBS to the environment. The Permittee also must provide a written notification within seven (7) days.
82. Within one working day, the Permittee must notify USEPA by telephone of any statistically significant increase in groundwater or the LDCRS samples. The Permittee also must provide a written notification within seven (7) days.

83. Within one working day, the Permittee must notify USEPA by phone if the leachate depth over the primary liner exceeds one (1) foot depth for more than 72 hours or the volume of water or leachate from the cell exceeds the mean value plus three (3) standard deviations calculated from the last two years records for the sample point.

84. Within one working day, the Permittee must notify the EPA by telephone of any perimeter air station sample result of three tenths micrograms per cubic meter (0.3 $\mu g/m^3$) of PCB or greater. The Permittee also must provide a written notification within seven (7) days.

85. For the one working day telephone notification, the Permittee must contact USEPA Regional Office, Toxics Program Section, at (312) 886-6003. For the seven (7) day written notification, the Permittee must contact the Division Director for Waste Pesticides and Toxics Division:

U.S. Environmental Protection Agency
77 W. Jackson (D-8J)
Chicago, Illinois 60604

86. If there is a spill or release of anything from Cell VI which poses a potential for significant exposure to humans, animals, or the environment, the event must be reported to the USEPA Regional Office, Toxics Program Section at (312) 886-6003. In addition, the Permittee must abide by any other federal, state and local reporting requirements by the next business day.

SAFETY AND HEALTH REQUIREMENTS

87. USEPA may subject the Permittee to operational changes if twenty-four (24)-hour perimeter air monitoring samples exceed five tenths micrograms per cubic meter (0.5 $\mu g/m^3$) of PCB.

88. USEPA may subject the Permittee to temporary work stoppage if twenty-four (24) hour perimeter air monitoring samples exceed one microgram per cubic meter (1.0 $\mu g/m^3$) of PCB.

89. PCBs must not be found in the air above Master Cell VI at levels that constitute unacceptable work conditions using criteria compatible with those of the Occupational Safety and Health Agency, OSHA.

90. PCBs at levels in excess of 1 ppm may not be allowed to build up around the sides of Master Cell VI in such a way that sudden storms could wash them offsite. Concentrations up to but not exceeding 10 ppm PCBs may be covered with 10 inches of clean soil and then with a ground cover.

91. Operational changes and cleanups must be completed in accordance with the PCB regulations.

92. PCB material must be immediately managed in such a way as to prevent odors from TSCA regulated material being noticeable offsite.

93. The Permittee must follow the inspection guidelines in General Inspection Schedule, Wayne Disposal Site #2, Hazardous Waste Landfill, Revision 3.1 - February 2001.

94. To minimize exposure to PCB, workers must use the safety procedures and protective clothing described in the application and the:

    a. Training Programs for Hazardous Waste Workers dated 1995, as revised.

    b. Training Programs to Operate and Maintain TSDF, Attachment A-28, October 18, 1995, as revised.

CELL SECURITY

95. The TSCA disposal Cell must be secured to restrict public access.

COMPLIANCE WITH GOVERNMENTAL REQUIREMENTS

96. Nothing in this Approval relieves the Permittee from the duty to comply with all applicable state and federal laws, including, but not limited to CERCLA, RCRA and TSCA and the regulations promulgated thereunder.

97. Any knowing or persistent failure of the Permittee to comply with all applicable federal laws, regulations, requirements or orders could result in the termination of the Permittee's authority to dispose of PCBs in Master Cell VI.

MODIFICATIONS

98. Any major modification of this Approval requires the written approval of the Director of the Waste Pesticides and Toxics Division, Region 5, USEPA. If there is any question as to whether a change in operations is a major or minor modification, such question should be raised to the appropriate representative(s) of USEPA as soon as possible. In such cases, the Agency will determine whether a proposed change is major or minor. No oral modifications shall be granted.
99. Any minor modification of the TSCA disposal operations and monitoring procedures requires written approval of the Chief, PTSB Branch, WPTD, Region 5, USEPA. No oral modifications shall be granted.

INSPECTION

100. The Agency reserves the right for its employees and authorized representatives to perform inspections, review records, and take samples at any reasonable time.

CLOSURE AND POST-CLOSURE

101. Closure of Master Cell VI must be approved in writing by MDEQ and USEPA and completed pursuant to an updated Closure and Post-closure Plan approved in writing by MDEQ and USEPA. The Permittee must get written approval from MDEQ and the Director of the Waste Pesticides and Toxics Division, Region 5, USEPA prior to the closure of Master Cell VI.

102. PCB waste may not be disposed of in Master Cell VI after the remaining portion of the originally authorized one million four hundred and thirty-five thousand (1,435,000) cubic yards of waste and the newly authorized two million eight hundred and ninety thousand (2,890,000) cubic yards of waste have been placed in the Cell, as designed pursuant to architectural and engineering documents approved by USEPA and the State of Michigan.

103. One Hundred and Eighty (180) Days prior to closure of the Cell, the Permittee shall submit an updated Closure and Post-closure Plan to USEPA. This written plan shall describe in detail how the Facility will be closed; the care that will be provided in perpetuity after closure; a closure and post-closure cost estimate and a demonstration of financial responsibility to close the facility and provide post-closure care. This plan must be submitted to USEPA whether or not the Permittee has already provided a RCRA Closure and Post-Closure Plan to MDEQ and USEPA. USEPA must approve the updated Closure and Post-Closure Plan in writing prior to closure of Master Cell VI.

104. The closure of Master Cell VI requires installation of a final cap. The cap design must be approved by USEPA in writing.

105. Upon closure, the Permittee must remediate areas outside of the Cell contaminated by PCB in excess of one ppm or ten micrograms of PCBS per hundred square centimeters (10 $\mu g/100\ cm^2$). The Permittee may cap and seed areas which remain contaminated by PCBS at a level greater than one (1) ppm but less than ten (10) ppm with ten (10) inches of clean soil.

106. The Permittee must care for the Cell and perform post-closure environmental monitoring and maintenance in perpetuity.

FINANCIAL ASSURANCE FOR CLOSURE AND POST-CLOSURE CARE

107. The Permittee must maintain in perpetuity financial assurance for closure and post-closure care costs.

108. The Permittee must submit proof of financial assurance to USEPA annually. If USEPA determines that the amount is inadequate, the Permittee must obtain additional financial assurance funding. Failure to do so will result in a termination of the Permittee's authority to dispose of PCBS in Master Cell VI or, if the Cell has been closed, may subject the Permittee to civil or criminal penalties under TSCA and the PCB regulations.

109. The Permittee must annually adjust the closure and post-closure care thirty (30) year cost estimates for inflation. This may require an increase in the financial assurance funding mechanism.

110. The Permittee must adjust the closure and post-closure care cost estimates for any modification or change that increases these costs. This may require an increase in the financial assurance funding mechanism. 40 C.F.R. § 761.65(f)(2).

111. While the amount of financial assurance required by the State of Michigan may decrease over the thirty-year post-closure care period, the amount required by USEPA will not decrease since the post-closure care period for the Cell is not limited to thirty years, rather it lasts in perpetuity. The Permittee must secure financial assurance funding for the

difference in these amounts and must designate the State of Michigan as the beneficiary of this additional funding. The Permittee must demonstrate in writing that it has complied with this condition prior to beginning closure of Master Cell VI.

112. The Permittee must submit to USEPA for Agency review, 180 days prior to closure of the Cell, an updated financial assurance and liability document, similar to the document enclosed in the Permittee's disposal application, for post-closure care for thirty (30) year funding intervals. USEPA will determine whether or not the value of the financial assurance mechanism provides sufficient financial assurance for the performance of Cell monitoring and maintenance activities for the next thirty (30) year period. If USEPA determines in writing that the financial assurance mechanism does not provide sufficient financial assurance for the performance of Cell monitoring and maintenance activities for the next thirty (30) year period, the Permittee must revise and/or establish a new financial mechanism. Any new mechanism established under this paragraph must be in an amount that reflects the then-present value of the estimated costs of Cell monitoring and maintenance activities necessary to assure effectiveness and integrity of the landfill for the next thirty (30) year period. Any new financial assurance mechanism must be in place within thirty (30) days after receipt by the Permittee of the written determination by USEPA. The financial assurance and liability document must be submitted to USEPA and will similarly be evaluated every five (5) years for each upcoming 30 year funding interval.

APPROVAL EXPIRATION

113. This Approval does not expire unless and until all PCBS are removed from Master Cell VI. Otherwise the Approval's conditions remain valid in perpetuity.

114. The Permittee's authority to place PCBS in Master Cell VI will expire five (5) years after the date the Approval is executed by the Director, Waste Pesticides and Toxics Division, Region 5, USEPA. The Permittee must submit a written request to the Director, at least one hundred and eighty (180) days prior to the PCB-Placement-authority expiration date, for a major modification of the Approval to extend this expiration date. The authority to place PCB waste in Master Cell VI and the conditions of this approval herein will remain in effect beyond the placement expiration date if WDI has submitted a timely, complete and adequate notice of intent to continue the placement of PCBS and, through no fault of WDI, the Division Director has not issued an approval renewal.

PCB DISPOSAL AUTHORITY SUSPENSION AND TERMINATION

115. Failure to comply with any provision of this Approval, TSCA, the federal PCB regulations found at 40 CFR Part 761, or any other applicable federal, State or local requirements may constitute a sufficient basis for suspension or termination of the Permittee's authority to place PCBS in Master Cell VI.

APPROVAL TERMINATION

116. Failure to comply with any provision of this Approval, TSCA, the federal PCB regulations found at 40 CFR Part 761, or any other applicable federal, State or local requirements may constitute a sufficient basis for termination of the Approval. Termination of the Approval will require that the Permittee, or its successors or assigns, remove all PCBS from Master Cell VI.

117. The Approval may also be terminated if the Director of the Waste, Pesticides and Toxics Division, Region 5, USEPA determines that the Cell poses an unreasonable risk to human health or the environment.

PCB DISPOSAL AUTHORITY REINSTATEMENT

118. The Director of the Waste, Pesticides and Toxics Division, Region 5, USEPA may reinstate the Permittee's authority to place PCBS in Master Cell VI if it is determined that the unsafe practices or conditions have been eliminated.

SEVERABILITY

119. All terms and/or conditions of this Approval are severable. If any provision(s) of this Approval or any application of any provision, is changed, amended, or held invalid, the remaining terms and conditions will still be valid and not affected thereby.

OWNERSHIP TRANSFER

120. The requirement for perpetual care transfers with ownership of the cell.

121. The Permittee must notify USEPA, at least one hundred and eighty (180) days before transferring ownership of the Cell, where a new approval must be prepared, or 30 days beforehand when the approval is current and the new owner's records are complete.

122. The Permittee must similarly notify State and local agencies of the transfer of ownership before transferring ownership of the Cell.

123. Should the transferor fail to provide USEPA with the required written documentation of sale or transfer or to provide this documentation within the time required, this Approval may be terminated.

124. At least sixty (60) days before the transfer, the prospective transferee must submit to USEPA:

a. a written statement identifying the name, address and telephone number of the transferee;

b. copies of the transferee's last four (4) years of federal income tax returns, including all schedules;

c. a notarized affidavit signed by the transferee which states that the transferee will abide by the transferor's Approval;

d. a listing of past environmental violations by the transferee, its employees or assigns;

e. the qualifications of the principals and key employees;

f. proof of financial assurance acceptable to USEPA and funding in a manner similar to that set forth at 40 CFR § 761.65(g); and

g. any other applicable materials to document compliance with the requirements of 40 CFR § 761.75.

125. After reviewing the notification, affidavit, and background information, USEPA will either issue an amended Approval substituting the transferee's name for the transferor's name or require the transferee to apply for a new PCB disposal approval. In the latter case, the transferee must abide by the transferor's Approval until the Agency issues the new approval to the transferee.

126. If the transferee is required to apply for a new PCB TSCA disposal approval, the transferee must submit to the Director of the Waste, Pesticides and Toxics Division, Region 5, USEPA a complete TSCA application for disposal, closure and post-closure care.

BANKRUPTCY

127. In the event that the Permittee, or its successor or assigns, declare bankruptcy, the Permittee shall immediately provide written notice of such to the Director of the Waste, Pesticides and Toxics Division, Region 5, U.S. EPA.

COMMUNITY RIGHT-TO-KNOW

128. The Permittee must make reasonable efforts to establish a Community Involvement Council to provide a forum for ongoing exchange and cooperation between the Company and the local residents. The Council must be composed of Company and Community representatives. The Council, as described in the draft Community Involvement Council Work Plan dated December 20, 2000 will have the inaugural meeting within 100 days of issuance of this permit.

129. Within thirty (30 days) from the issuance of this Approval, the Permittee must determine if the Charter Township of Van Buren and the Charter Township of Ypsilanti wish to receive copies of any or all reports required to be submitted under the Approval. The Permittee must make arrangements with the Township officials if the Townships wish to receive the quarterly and annual reports. The Permittee must notify USEPA of the Townships' decision.

WAIVER

USEPA hereby waives the requirement for a fifty-foot distance between the bottom of the landfill liner and the historical high groundwater table found in the PCB regulations at 40 CFR §761.75(b)(3). This requirement is waived because of Finding 6-b which states the bottom of the Cell is underlain by a clay pan that meets TSCA requirements consisting of ten (10) feet of clay with a permeability of 10^{-7} cm/sec and Finding 10 which states the Cell is constructed with safety features that exceed TSCA requirements such as two double-thick synthetic membrane liners with a three foot thick clay interliner and a compound leachate collection/leak detection collection and removal system.

APPROVAL

I. In accordance with 40 CFR § 761.75 and the findings above, USEPA has determined that the Permittee's Application is consistent with TSCA and that the Cell, when operated in compliance with the Conditions of Approval, does not present an unreasonable risk of injury to health or the environment from PCBS. Providing the Conditions of Approval described above are met, the Permittee's March 23, 2000 application for a modified Approval, as amended, is approved.

II. Approval to dispose of two million eight hundred ninety thousand (2,890,000) cubic yards of waste in addition to the remaining one million four hundred and thirty-five thousand (1,435,000) cubic yards of waste previously approved for disposal in the Cell is hereby granted to the Permittee, subject to the conditions of the Approval expressed herein and consistent with the material and data included in the Permittee's TSCA PCB Approval application, as amended, referenced above.

III. Any major modification of the conditions of the Approval or re-authorization to place waste must receive the prior written approval of the Director of the Waste, Pesticides and Toxics Division, Region 5, USEPA.

IV. USEPA reserves the right to impose additional conditions if the Agency has reason to believe that the Cell presents an unreasonable risk to health or the environment from PCB or if USEPA issues new regulations or standards for issuing TSCA PCB approvals.

V. Violations of any applicable Federal or State laws or regulations; failure to comply with the terms and Conditions of Approval herein; failure of Permittee to disclose all relevant information or facts to the Agency, or for any other reason which the Director of the Waste, Pesticides and Toxics Division, Region 5, USEPA, deems necessary to protect public health and the environment; may result in the suspension or termination of the Permittee's authority to place PCBS in Master Cell VI. This authority may also be terminated at any time if the history of environmental civil violations or criminal convictions evidences a pattern or practice of noncompliance that demonstrates the Permittee's unwillingness or inability to achieve and maintain compliance with the regulations. This authority may also be terminated if the Director of the Waste, Pesticides and Toxics Division determines the PCBS disposed of in Master Cell VI pose an unreasonable risk to human health or the environment. Violation of the Approval, TSCA, or the PCB regulations may subject Permittee to civil or criminal enforcement action and associated penalties.

VI. In order to protect human health and the environment from an unreasonable risk of injury from PCBS, the Director of the Waste Pesticides and Toxics Division, USEPA may require the removal of some or all of the PCBS disposed of in Master Cell VI. Only the removal of all PCBS from Master Cell VI will result in the expiration of this approval.

VII. The Permittee is responsible for all actions of any of its agents, assigns, employees and contractors when those actions are within the scope of operating or administering the Cell and will assume full responsibility for compliance with all applicable federal, State and local regulations including, but not limited to, any advance or emergency notification and accident reporting requirements.

VIII. USEPA, reserves the right for its employees or agents to inspect the Cell and support facilities at any reasonable time. USEPA also reserves all legal rights available under all applicable statutes and regulations.

Robert Springer, Director
Waste Pesticides and Toxics Division
United States Environmental Protection
Agency, Region 5

Date: August 21, 2001